

AMENDMENTS TO THE CLAIMS

Please amend the claims as follows.

1. (Currently Amended) A method of transmitting and downloading a replacement version of resident software to a receiver/decoder comprising a bootstrap loader, comprising the steps, at the receiver/decoder of:
receiving a bitstream including ~~the~~ an instream loader and the replacement version of resident software comprising a resident loader for replacing the bootstrap loader;
downloading into the receiver/decoder the instream loader for loading ~~the~~ the replacement version of resident software comprising the resident loader from the bitstream using the bootstrap loader;
downloading the replacement version of resident software comprising the resident loader into the receiver/decoder from the bitstream using said instream loader, and
storing said replacement version of resident software comprising the resident loader into the receiver/decoder.
2. (Previously Presented) The method according to Claim 1, wherein the instream loader is deleted from the receiver/decoder after the replacement version of the resident software has been downloaded from the bitstream.
3. (Previously Presented) The method according to Claim 1, wherein the instream loader is subsequently stored in non-volatile memory of the receiver/decoder.
4. (Previously Presented) The method according to Claim 3, wherein the non-volatile memory is a Flash memory volume of the receiver/decoder.
5. (Cancelled)
6. (Previously Presented) The method according to claim 1, wherein a portion only of the replacement version of the resident software stored in the receiver/decoder is replaced by a corresponding portion of the replacement version of the resident software downloaded by the instream loader.
7. - 8. (Cancelled)

9. (Previously Presented) The method according to Claim 44, further comprising downloading module tables having the same TID.

10.-12. (Cancelled)

13. (Previously Presented) The method according to Claim 47, wherein the version identification comprises a code for the version of the receiver/decoder and a code for the manufacturer of the receiver/decoder.

14.-19. (Cancelled)

20. (Previously Presented) A receiver/decoder comprising:

- a bootstrap loader for downloading an instream loader from a bitstream;

- a receiver for receiving the bitstream including a replacement version of resident software comprising a resident loader for replacing the bootstrap loader and an instream loader;

- a storage means configured to store the replacement version of the resident software and the instream loader; and

- a downloading means configured to download the instream loader into the storage means from the bitstream,

- wherein the receiver/decoder is configured to execute the instream loader, and

- wherein the instream loader is configured to download the replacement version of the resident software comprising the resident loader into the storage means.

21. (Previously Presented) The receiver/decoder according to Claim 20, further comprising means for deleting the instream loader from the storage means after the replacement version of the resident software has been downloaded from the bitstream.

22. (Previously Presented) The receiver/decoder according to Claim 20, further comprising a non-volatile memory for storing the instream loader after the replacement version of the resident software has been downloaded from the bitstream.

23. (Previously Presented) The receiver/decoder according to Claim 22, wherein the non-volatile memory is a Flash memory volume of the receiver/decoder.

24. (Cancelled)

25. (Previously Presented) The receiver/decoder according to claim 20, wherein the instream loader is adapted to replace a portion only of the replacement version of the resident software stored in the receiver/decoder by a corresponding portion of the replacement version of the resident software downloaded thereby.

26. (Previously Presented) The receiver/decoder according to claim 20, arranged to download tables.

27. (Previously Presented) The receiver/decoder according to Claim 26, wherein said downloading means is arranged to download a table having a table identification ("TID") and a predetermined table identification extension ("TID-extension") so as to download a directory table, to determine from the content of the directory table the TID-extensions of module tables having the same TID as the directory table, and to download the module tables having the same TID as that of the downloaded directory table and TID-extensions determined from the downloaded directory table so as to download said instream loader.

28. (Previously Presented) The receiver/decoder according to Claim 26, wherein said downloading means is arranged to download a directory table having a predetermined TID and containing, for each of a plurality of version identifications of a receiver/decoder, a respective TID associated with that version identification, to determine the version identification of the receiver/decoder, and to download a directory table having a TID associated with a version number of the receiver/decoder and a predetermined TID-extension.

29. (Previously Presented) The receiver/decoder according to Claim 27, wherein said downloading means is arranged to determine whether a directory version identification of a currently transmitted directory table is more recent than the directory version identification of a previously downloaded directory table having the same TID as the currently transmitted directory table, and if not, to abort the downloading of said instream loader.

30. (Cancelled)

31. (Currently Amended) The receiver/decoder according to claim 20, wherein said downloading means is arranged to download a second resident loader included in the replacement version of the resident software included in said bitstream for downloading instream loader and the replacement version of the resident software.

32. - 33. (Cancelled)

34. (Previously Presented) The transmission system according to claim 53, wherein said tables have respective different TID-extensions other than a predetermined TID-extension; said system further comprising means for generating a respective directory tables for the plurality of modules having the same TID, each directory table having that TID and said predetermined TID-extension, the directory table containing for each of the modules a name of that module and the respective TID-extension.

35. (Previously Presented) The transmission system according to claim 52, further comprising:
means for generating a directory table having a predetermined table identification ("TID") and containing, for each of a plurality of version identifications of a receiver/decoder, a respective TID associated with that version identification.

36. (Previously Presented) The transmission system according to claim 52, further comprising means for including in each transmitted table a version identification therefor.

37.-38. (Canceled)

39. (Currently Amended) A signal including at least one instream loader for loading a replacement version of resident software into a receiver/decoder, and the replacement version of the resident software associated with the at least one instream loader, wherein the at least one instream loader is divided into a plurality of modules and the replacement version of the resident software associated with the at least one instream loader is divided into a respective plurality of modules, wherein the replacement version of the resident software comprises a resident loader for replacing a bootstrap loader of the receiver/decoder.

40.-42. (Canceled)

43. (Currently Amended) The method according to claim 1, comprising the steps, at ~~the~~ a transmission system, of:

dividing the at least one ~~data~~ instream loader into a plurality of modules; and
dividing the software into a respective plurality of modules, each plurality of the software modules being associated with a respective plurality of instream loader modules.

44. (Currently Amended) The method according to claim 43, further comprising:

formatting the plurality of ~~data~~ instream loader modules as respective tables, the tables having the same respective table identification ("TID") and respective different table identification extensions ("TID-extensions"); and
formatting the plurality of the software modules as a respective table, the tables having the same respective TID as the tables of the instream loader modules associated therewith and respective different TID.

45. (Currently Amended) The method according to claim 9 ~~43~~, wherein said tables have respective different TID-extensions other than a predetermined TID-extension, and further comprising:

generating a respective directory table for the plurality of modules having the same TID, the directory table having said predetermined TID-extension and the same TID, the directory table containing for the plurality of modules a name of a module and a respective TID-extension.

46. (Previously Presented) The method according to claim 45, further comprising:

downloading one of the tables having the predetermined TID-extension so as to download a directory table;
determining from the content of the directory table the TID-extensions of the module tables having the same TID as the directory table; and
downloading the module tables having the same TID as that of the downloaded directory table and TID-extensions determined from the downloaded directory table.

47. (Previously Presented) The method according to claim 1, further comprising:

generating a directory table having a predetermined table identification ("TID") and containing, for a plurality of version identifications of a receiver/decoder, a respective TID associated with that version identification.

48. (Previously Presented) The method according to claim 13, further comprising:

downloading said directory table having the predetermined TID; and determining the version identification of the receiver/decoder, wherein downloading a directory table comprises downloading that one of the tables having a TID associated with a version number of the receiver/decoder and a predetermined TID-extension.

49. (Previously Presented) The method according to claim 45, further comprising:

including in a transmitted directory table a directory version identification therefor; determining at the receiver/decoder whether the directory version identification of a currently transmitted directory table is more recent than the directory version identification of a previously downloaded directory table having the same TID as said currently transmitted table; and aborting downloading the data if the currently transmitted directory table is not more recent.

50. (Previously Presented) The method according to claim 1, further comprising:

including in the bitstream a software version identification of the replacement version of the resident software; determining, at the receiver/decoder, whether the software version identification of received replacement version of the resident software is more recent than the software version identification of currently stored replacement version of the resident software; and downloading the received replacement version of the resident software from the bitstream if the received replacement version of the resident software is more recent.

51. (Currently Amended) The method according to claim 1, further comprising:

transmitting a ~~second~~ resident loader included in said bitstream, to the receiver/decoder; downloading the ~~second~~ resident loader, at the receiver/decoder; and

downloading the instream loader and the replacement version of the resident software using the ~~second~~ resident loader.

52. (Currently Amended) A transmission system comprising:

means for transmitting a bitstream including at least one instream loader for loading a replacement version of resident software into a receiver/decoder, and the replacement version of the resident software associated with the at least one instream loader; and

means for dividing the at least one instream loader into a plurality of modules and dividing the replacement version of the resident software associated with the at least one instream loader into a respective plurality of modules for transmittal by said transmitting means.

53. (Currently Amended) The transmission system according to claim 52, further comprising:

means for formatting each of the modules of the at least one instream loader as a respective table, the table of the at least one instream loader having the same respective table identification ("TID") and respective different table identification extensions ("TID-extensions"); and

means for formatting each of the modules of the replacement version of the resident software associated with the at least one instream loader as a respective table, the table of the modules of data having the same respective TID as the tables of the instream loader modules associated therewith and respective different TID-extensions.

54. (Previously Presented) A method for updating resident software to a receiver/decoder, comprising:

downloading an instream loader using a bootstrap loader into the receiver/decoder;

downloading an updated resident software using the instream loader into the receiver/decoder, wherein the updated resident software comprises a resident loader;

updating the resident software in the receiver/decoder, wherein updating the resident software comprises replacing the bootstrap loader with the resident loader; and

deleting the instream loader from the receiver/decoder.

55. (Currently Amended) A receiver/decoder, comprising:
- resident software executing on the receiver/decoder,
 - a bootstrap loader configured to download a loader from a bit stream; and
 - a memory configured to store the loader and the resident software,
- wherein the loader is configured to download an updated version of the resident software,
- and
- wherein the receiver/decoder is configured to update ~~the the resident software-bootstrap~~ loader using the updated version of the resident software;
- wherein the receiver/decoded is configured to delete the loader once the resident software is updated.